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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/760,024	01/15/2004	Craig H. Barratt	ATH-0116	8508
30547	7590	12/28/2007	EXAMINER	
BEVER HOFFMAN & HARMS, LLP			FOUD, HICHAM B	
2099 GATEWAY PLACE			ART UNIT	PAPER NUMBER
SUITE 320			2619	
SAN JOSE, CA 95110			MAIL DATE	DELIVERY MODE
			12/28/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)
	10/760,024	BARRATT ET AL.
	Examiner	Art Unit
	Hicham B. Foud	2619

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 25 October 2007.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 50, 53, 57 and 61 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 50, 53, 57 and 61 is/are rejected.
- 7) Claim(s) _____ is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on 15 January 2004 is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) <input type="checkbox"/> Notice of References Cited (PTO-892)	4) <input type="checkbox"/> Interview Summary (PTO-413)
2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail Date. _____
3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____	5) <input type="checkbox"/> Notice of Informal Patent Application
	6) <input type="checkbox"/> Other: _____

DETAILED ACTION

Response to Amendment

1. The amendment filed on 10-25-2007 has been entered and considered.

Claims 50, 53, 57 and 61 are pending in this application.

Claims 1-49, 51-52, 54-56, 58-60 and 62-67 have been canceled.

Claims 50, 53, 57 and 61 remain rejected as discussed below.

Drawings

2. The drawings of Figures 2-4 are objected to because of the absence of descriptive legends. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the

examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

3. Figure 2 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). Corrected drawings in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Specification

4. The abstract of the disclosure is objected to because it should describe the invention as a whole and not only some embodiments. Correction is required. See MPEP § 608.01(b).

5. Applicant is reminded of the proper content of an abstract of the disclosure.

A patent abstract is a concise statement of the technical disclosure of the patent and should include that which is new in the art to which the invention pertains. If the patent is of a basic nature, the entire technical disclosure may be new in the art, and the abstract should be directed to the entire disclosure. If the patent is in the nature of an improvement in an old apparatus, process, product, or composition, the abstract should include the technical disclosure of the improvement. In certain patents, particularly those for compounds and compositions, wherein the process for making and/or the use thereof are not obvious, the abstract should set forth a process for making and/or use thereof. If the new technical disclosure involves modifications or alternatives, the abstract should mention by way of example the preferred modification or alternative.

The abstract should not refer to purported merits or speculative applications of the invention and should not compare the invention with the prior art.

Where applicable, the abstract should include the following:

- (1) if a machine or apparatus, its organization and operation;
- (2) if an article, its method of making;
- (3) if a chemical compound, its identity and use;
- (4) if a mixture, its ingredients;
- (5) if a process, the steps.

Extensive mechanical and design details of apparatus should not be given.

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 50, 53, 57 and 61 are rejected under 35 U.S.C. 103(a) as being unpatentable over Jayaraman et al. (US Patent #6963549 B1) and in view of Iwamura (US Paten #7206320 B2)and in further view of JP 11261518, hereinafter JP'518.

As per claim 50, Jayaraman et al clearly discloses that a method of minimizing collisions in a CSMA/CA wireless data communication system using an access point, the method comprising: sensing the presence of a client desirous of communication with the access point (See Fig. 1, a local station 20 may request (block 61 of FIG. 2) that a particular bandwidth be reserved for a given traffic type over a defined period of time, column 2, lines 66-67 to column 3, line 1); allocating a start time slot list having at least one unique start time slot during which the client may begin transmitting (The central

authority is used to selectively reserve the time slot based on at least in part a reservation schedule, column 1, lines 60-62); transmitting the start time slot list to the client (indicates the reserved time slot in the frame that is transmitted (block 78) to the requesting station, column 3, lines 11-16); and receiving a transmission from the client, the transmission beginning only during the start time slot(s) indicated by the start time slot list (If the central authority reserves the time slot, then during the time slot, the central authority prevents the other local stations from transmitting (column 1, lines 62-64).

Jayaraman et al. clearly shows and discloses all the claimed invention. However, Jayaraman et al. does not teach wherein allocating includes: assigning at least one pair of a high-priority start time slot and a low-priority start time slot substantially equally displaced in time from a center start time slot. In the same field of endeavor, Iwamura et al. teaches wherein allocating includes: assigning at least one pair of a high-priority start time slot and a low-priority start time slot (During arbitration for a time slot(s), transmissions having higher priority win out over transmissions of lower priority, column 11, lines 2-4). Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention to combine the teaching of Jayaraman et al. with the teaching of Iwamura et al because in order to achieve Quality of Service in communications in which signal delays or interruptions cannot be tolerated, it is required that the data communication should be isochronous, and packets related to such communications should be transmitted/retransmitted with higher priorities.

The combination of Jayaraman et al and Iwamura et al. as discussed above shows the

limitations claimed, except they do not specifically disclose that substantially equally displaced in time from a center start time slot. In the same field of endeavor, JP'518 teaches that substantially equally displaced in time from a center start time slot (See Fig. 1 and abstract, time slots for downlink circuits (12) of a TDMA frame (8) arranged in succession from the center of continuous time slots). Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention to combine the teaching of Jayaraman et al and Iwamura et al. with the teaching of JP'518 because it can ensure easy transmission of data and asymmetrical data in different data velocities.

Claims 53 and 61 are rejected for same reasons as claim 50.

As per claim 57, Iwamura et al. further teach wherein the selecting includes selecting between the high-priority start time slot and the low-priority start time slot (column 11, lines 2-4) and teach selecting the start time slot based on a randomizing function (Column 2 lines 11-14).

Response to Argument

7. Applicant's arguments filed under Remarks have been fully considered but they are not persuasive.

In regards of claims 50, 53, 57 and 61, they are rejected under 103(a) for obviousness. However, the applicant is not arguing the combination of the references but instead, he is arguing each reference by itself. It is noted that the test for obviousness is not whether the features of a secondary reference may be bodily

incorporated into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981). Also, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). Moreover, it is clear at least from Figure 12 of Iwamura that time slot T2 can be divided to different priorities High and low and also the limitations uses the terms "at least" and "includes" which means that the time slot can have more than two priorities as in Iwamura's invention that has three priorities.

Conclusion

8. **Examiner's Note:** Examiner has cited particular columns and line numbers in the references applied to the claims above for the convenience of the applicant. Although the specified citations are representative of the teachings of the art and are applied to specific limitations within the individual claim, other passages and figures may apply as well. It is respectfully requested from the applicant in preparing responses, to fully consider the references in entirety as potentially teaching all or part of the claimed invention, as well as the context of the passage as taught by the prior art or disclosed by the Examiner. In the case of amending the claimed invention, Applicant is

respectfully requested to indicate the portion(s) of the specification which dictate(s) the structure relied on for proper interpretation and also to verify and ascertain the metes and bounds of the claimed invention.

When responding to this office action, applicants are advised to clearly point out the patentable novelty which they think the claims present in view of the state of the art disclosed by the references cited or the objections made. Applicants must also show how the amendments avoid such references or objections. See 37C.F.R 1.111(c). In addition, applicants are advised to provide the examiner with the line numbers and pages numbers in the application and/or references cited to assist examiner in locating the appropriate paragraphs.

9. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hicham B. Foud whose telephone number is 571-270-1463. The examiner can normally be reached on Monday - Thursday 10-3 EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chau T. Nguyen can be reached on 571-272-3126. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Hicham Foud
12/20/07



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